

PATENT

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Application No.:

Not yet assigned - 371 of PCT/JP2004/000971

International

Filing Date:

30 January 2004 (30.01.2004)

Applicant:

Koji MORIKAWA, et al.

Title:

=:

PREDICTIVE ACTION DETERMINATION

APPARATUS AND ACTION DETERMINATION

METHOD

Attorney Docket:

5077-227/NP

Director of the United States Patent and Trademark Office P.O. Box 1450 Alexandria, VA 22313-1450

INFORMATION DISCLOSURE STATEMENT

Sir:

Pursuant to 37 C.F.R. §§ 1.56, 1.97 and 1.98, Applicant hereby submits an Information Disclosure Statement for consideration by the Examiner.

I. LIST OF PATENTS, PUBLICATIONS, AND OTHER INFORMATION

The patents, publications and other information requested to be considered by the Office (except unpublished U.S. patent applications) are listed on Form 1449 attached hereto.

II. <u>COPIES</u>

| A Submitted herewith is a legible copy of (i) each U.S. paten |
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| application publication and U.S. and foreign patent; (ii) each publication o |
| that portion which caused it to be listed; (iii) for each cross-referenced |
| pending U.S. application listed below in Section IV, the application |
| specification including the claims, and any drawing of the application which |
| caused it to be listed including the claims directed to that portion; and (iv) al |
| other information or that portion which caused it to be listed. |
| |

B. ____ Any patents, publications or other information which are listed on Form 1449 or on the copies of PTO-892, but which are not enclosed herewith, were previously cited by or submitted to the PTO in one of the following applications which has been relied upon for an earlier filing date under 35 U.S.C. § 120:

U.S. Serial Number

U.S. Filing Date

| C Because the present application was/is being filed after June 30, 2003, no copies of the U.S. patents or U.S. patent application publications which are listed on the attached Form 1449 are enclosed pursuant to the waiver of 37 C.F.R. § 1.98(a)(2)(i). Any foreign patent documents or non-patent literature listed on the attached Form 1449 are enclosed herewith. |
|---|
| D. X This is a PCT application in the entry of the National Phase in the United States. A copy of the International Search Report is attached for the Examiner's information. The documents listed on the International Search Report are listed on the attached Form-1449 for consideration by the Examiner and for listing on any patent resulting from this application. If the International Search Report was from the US, EPO, or JPO search authorities, copies of these references should have been supplied to the USPTO under the trilateral agreement and are believed to be in the file of the above-identified application. (MPEP 1893.03(g)). Any additional foreign patent documents listed on the attached Form 1449 are enclosed herewith. |
| CONCISE EXPLANATION OF THE RELEVANCE (check at least one box) |
| A Except as may be indicated below in (B), all of the patents, publications or other information are in the English language (concise explanation not required). |
| B. X A concise explanation of the relevance of each patent, publication or other information listed that is not in the English language is as follows (see 37 C.F.R. § 1.98(a)(3)): |
| X See the attached foreign patent office communication from a counterpart foreign application. International Search Report for PCT/JP2004/000971 X English translations are provided, as noted on Form HDP-1449 Other: |
| CThe following additional information is provided for the Examiner's consideration. |
| CROSS REFERENCE TO RELATED APPLICATION(S) |
| AThe Examiner is advised that the following co-pending application(s) contain(s) subject matter that may be related to the present application. By bringing this(these) application(s) to the Examiner's attention, Applicant(s) does(do) not waive the confidentiality provisions of 35 U.S.C. § 122. |

Filing Date

V. THIS IDS IS BEING FILED UNDER

Serial No.

A. X 37 C.F.R. § 1.97(b): (check only one box)

III.

IV.

Art Unit

| | 1 within three months of the filing date of a national application other than a continued prosecution application under § 1.53(d) (37 C.F.R. § 1.97(b)(1)). No fee or certification is required. |
|-------------------------|---|
| | 2. X within three months of the date of entry of the national stage as set forth in §1.491 in an international application (37 C.F.R. § 1.97(b)(2)). No fee or certification is required. |
| | 3 before the mailing of a first Office Action on the merits (37 C.F.R. § 1.97(b)(3)). No fee or certification is required. In the event that a first Office Action on the merits has been issued, please consider this IDS under 37 C.F.R. § 1.97(c) and see the certification under 37 C.F.R. § 1.97(e) below; or, if no certification has been made, charge our deposit account a fee in the amount of \$180.00 as required by 37 C.F.R. § 1.17(p). |
| | 4 before the mailing of a first Office Action after the filing of a request for continued examination under 37 C.F.R. § 1.114. No fee or certification is required. |
| В | 37 C.F.R. § 1.97(c) : (check <u>only</u> one box) |
| | before the mailing date of either any Final Office Action under 37 C.F.R. § 1.113, a Notice of Allowance under 37 C.F.R. § 1.311, or an action that otherwise closes prosecution. |
| | 1No certification; therefore, a fee in the amount of \$180.00 is required by 37 C.F.R. § 1.17(p). |
| | 2See the certification below. No fee is required. |
| C | _37 C.F.R. § 1.97(d): |
| | after the mailing date of either a Final Office Action under 37 C.F.R. § 1.113 or a Notice of Allowance under 37 C.F.R. § 1.311, yet on or before payment of the issue fee. |
| | 1See the certification below. A fee in the amount of \$180.00 is required by 37 C.F.R. § 1.17(p). |
| CERT | IFICATION UNDER 37 C.F.R. § 1.97(e): (check only one box) |
| The u | ndersigned hereby certifies that: |
| comm not m 1.97(e | each item of information contained in this IDS was first cited in a unication from a foreign patent office in a counterpart foreign application ore than three months prior to the filing of this IDS (See 37 C.F.R. § a)(1)). See further statement under 37 C.F. R. 1.704(d) below in section applicable; or |

VI.

- B. ____ no item of information contained in this IDS was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the undersigned after making reasonable inquiry, no item of information contained in this IDS was known to any individual designated in 37 C.F.R. § 1.56(c) more than three months prior to the filing of this IDS (See 37 C.F.R. § 1.97(e)(2)).
- C. ____Some of the items of information were first cited in a communication from a foreign patent office. As to this information, the undersigned hereby certifies that each item of information contained in this IDS was cited in a communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of this IDS. As to the remaining information, the undersigned hereby certifies that no item of this remaining information contained in this IDS was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the undersigned after making reasonable inquiry, no item of information contained in this IDS was known to any individual designated in 37 C.F.R. § 1.56(c) more than three months prior to the filing of this IDS.

VII. STATEMENT UNDER 37 CFR 1.704(d)

The undersigned hereby states that:

each item of information contained in this IDS was cited in a communication from a foreign patent office in a counterpart application and this communication was not received by any individual designated in 37 C.F.R. § 1.56(c) more than thirty days prior to the filing of this IDS.

VIII. PAYMENT OF FEES (check only one box)

- A. ____ A check in the amount of \$180.00 is enclosed for the above-identified fee.
- B. ____Please charge Deposit Account No. 08-0750 in the amount of \$180.00 for the above-indicated fee. A duplicate copy of this paper is attached.

The above references are being cited only in the interest of candor and without any admission that they constitute statutory prior art, contain matter which anticipates the invention, or which would render the same obvious, either singly or in combination, to a person of ordinary skill in the art. Furthermore, this Information Disclosure Statement shall not be construed as a representation that a search has been made.

If it is determined that this IDS has been filed under the wrong rule, the PTO is requested to consider this IDS under the proper rule (with a petition if necessary) and charge the appropriate fee to Deposit Account No. 08-0750.

ec'd 9CT/PTO 0 2 FEB 2005

Please charge any additional fees or credit any overpayment pursuant to 37 C.F.R. § 1.16 or § 1.17 to Deposit Account No. 08-0750.

Respectfully submitted,

Dated: February 2, 2005

Reg. No. 28,764

HARNESS, DICKEY & PIERCE, P.L.C. P.O. Box 828 Bloomfield Hills, Michigan 48303 (248) 641-1600

GAS/smc

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DT05 Rec'd PCT/PT0 0 2 FEB 2005

FORM HDP-1449 (Based on Form PTO-1449)

PATENT AND TRADEMARK OFFICE INFORMATION DISCLOSURE CITATION

(Use several sheets if necessary)

Sheet 1 of 2

| ATTORNEY DOCKET NO. | SERIAL NO. |
|-----------------------|------------|
| 5077-227/NP | |
| APPLICANT | |
| Koji MORIKAWA, et al. | |
| FILING DATE | GROUP |
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| U.S. PATENT DOCUMENTS | | | | | | |
|-----------------------|------------------------|--------------------|------|------|--------------------|---------------------------------|
| Ref. Desig. | Examiner's Initials | Document Number | Date | Name | Class/ Subclass | (If appropriate) Filing Date |
| 1. | | | | | | |

| FORE | FOREIGN PATENT DOCUMENTS | | | | | | |
|----------------|--------------------------|--------------------|------------|---------|--------------------|--------------------|----|
| Ref. Desig. | Examiner's Initials | Document Number | Date | Country | Class/ Subclass | Translation Yes | No |
| 1. | | 9-297690 A | 11/18/1997 | JP | | | |
| 2. | | 9-245015 A | 09/19/1997 | JP | | | |
| 3. | | 2002-059384 | 02/26/2002 | JP | | Abstract | |
| 4. | | 2002-189502 | 07/05/2002 | JP | | Abtract | |
| 5. | | 7-306998 A | 11/21/1995 | JP | | Abstract | |

| OTHE | OTHER DOCUMENTS (including Author, Title, Date, Pertinent Pages, etc.) | | | | | |
|----------------|--|--|--|--|--|--|
| Ref. Desig. | Examiner's Initials | | | | | |
| 1. | | Taku YOSHIOKA et al., "Kyoka Gakushu ni yoru Othellono Senryaku Kakutoku", Dai 32 Kai Jinko Chino Kisoron Kenkyukai Shiryo, The Japanese Society for Artificial Intelligence, Japan, 26 March 1998 (26.03.98), pages 115 to 120; page 116, left column, lines 22 to 35 | | | | |
| 2. | | Takeshi ITO, "Shogi no Kansosen ni Mirareru Tansakuno Henka Katei", Information Processing Society of Japan Kenkyu Hokoku, Information Processing Society of Japan, Vol. 2001, No. 28, 16 March 2001 (16.03.01), pages 47 to 54; page 48, left column, lines 31 to 40 | | | | |
| 3. | | Yasuharu KOIKE, Kenji Dotani, "Multi Step Jotai Yosoku o Mochiita Kyoka Gakushu-Chumokuten Idoten o Koryo shita Jidosha Unten Model", The Institute of Electronics, Information and Communication engineers Gijutsu Kenkyu Hokoku, The Institute of Electronics, Information and Communication Engineers, Vol. 98, No. 673, 18 March 1999 (18.03.99), pages 241 to 247 | | | | |
| 4. | | Koichiro TAKITA et al., "Pulse Neural Network ni Okeru Network Kakuchogata Kyoka Gakushu Algorithm", The Institute of Electronics, Information and Communication Engineers Gijutsu Kenkyu Hokoku, The Institute of Electronics, Information and Communication Engineers, Vol. 99, No. 684, 13 March 2000 (13.03.00), pages 181 to 188, full text, all drawings | | | | |

| Evaminar: | Data Canaidarad |
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| Examiner: | Date Considered: |
| | |



| FORM HDP-1449 | (Based on Form | PTO-1449 |
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PATENT AND TRADEMARK OFFICE INFORMATION DISCLOSURE CITATION

(Use several sheets if necessary)

Sheet 2 of 2

| ATTORNEY DOCKET NO. | SERIAL NO. |
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| 5077-227/NP | |
| APPLICANT | |
| Koji MORIKAWA, et al. | |
| FILING DATE | GROUP |
| | |

| OTHE | OTHER DOCUMENTS (including Author, Title, Date, Pertinent Pages, etc.) | | | | |
|----------------|--|---|--|--|--|
| Ref. Desig. | Examiner's Initials | | | | |
| 5. | | Shingo OCHIAI et al., "Kyoka Gakushu o Mochiita Kyugi Dosa no Yosoku to Seigyo", The Institute of Electronics, Information and Communication Engineers Gijutsu Kenkyu Hokoku, The Institute of Electronics, Information and Communication Engineers, Vol. 97, No. 69, 23 May 1997 (23.05.97), pages 69 to 75; full text; all drawings | | | |
| 6. | | International Search Report for PCT/JP2004/000971; ISA/JP; Dated: 03/24/2004 | | | |

| Examiner: | Date Considered: | |
|-----------|------------------|--|
| | Baio Concidence: | |